AMENDMENTS TO THE CLAIMS

1. (Withdrawn) A microorganism belonging to the genus Escherichia and having purine nucleoside-producing ability.

2. (Withdrawn) The microorganism according to claim 1, which has acquired the purine nucleoside-producing ability because of an increase of an activity of an enzyme involved in purine nucleoside biosynthesis in cells of the microorganism.

3. (Withdrawn) The microorganism according to claim 1, which has acquired the purine nucleoside-producing ability because of an increase of an expression amount of a gene for an enzyme involved in purine nucleoside biosynthesis.

4. (Withdrawn) The microorganism according to claim 1, which has acquired the purine nucleoside-producing ability because of deregulation of control of an enzyme involved in purine nucleoside biosynthesis.

5. (Withdrawn) The microorganism according to claim 4, the control of the enzyme involved in the purine nucleoside biosynthesis is desensitized by desensitization of feedback inhibition.

6. (Withdrawn) The microorganism according to claim 3, wherein the enzyme involved in the purine nucleoside biosynthesis is phosphoribosyl pyrophosphate amidotransferase.

7. (Withdrawn) The microorganism according to claim 3, wherein the enzyme involved in the purine nucleoside biosynthesis is phosphoribosyl pyrophosphate synthetase.

8. (Withdrawn) The microorganism according to claim 3, wherein the control of the enzyme involved in the purine nucleoside biosynthesis is derepressed by inactivation of a purine repressor.

9. (Withdrawn) The microorganism according to claim 1, which has acquired the purine nucleoside-producing ability because of blockage of a reaction branching from purine nucleoside biosynthesis and leading to another metabolite.

10. (Withdrawn) The microorganism according to claim 9, wherein the reaction branching from the purine nucleoside biosynthesis and leading to another metabolite is a reaction catalyzed by an enzyme selected from the group consisting of succinyl-adenosine monophosphate synthase, purine nucleoside phosphorylase, adenosine deaminase, inosine-guanosine kinase, guanosine monophosphate reductase, 6-phosphogluconoate deydrase, phophoglucose isomerase, adenine deaminase, and xanthosine phosphorylase.

11. (Withdrawn) The microorganism according to claim 1, which is enhanced in the purine nucleoside-producing ability by weakening of incorporation of a purine nucleoside into cells of the microorganism.

12. (Withdrawn) The microorganism according to claim 11, wherein the incorporation of the purine nucleoside into cells of the microorganism is weakened by blockage of a reaction involved in the incorporation of the purine nucleoside into cells of the microorganism, and the reaction involved in the incorporation of the purine nucleoside into cells of the microorganism is a reaction catalyzed by nucleoside permease.

13. (Currently Amended) A method for producing a purine nucleoside by fermentation comprising:

culturing a microorganism in a culture medium to produce and accumulate the purine nucleoside in the medium, and

collecting the purine nucleoside,

wherein the microorganism belongs to the genus *Escherichia* and ~~has purine nucleoside-producing ability arising from inhibition of~~ is modified to block a reaction

branching from purine nucleoside ~~biosynthesis,~~ biosynthesis and leading to another ~~metabolite,~~ metabolite in said microorganism,

wherein said microorganism produces an amount of purine nucleoside that is greater than the amount produced by the corresponding wild type microorganism, and

wherein said reaction is catalyzed by an enzyme selected from the group consisting of succinyl-adenosine monophosphate synthase, purine nucleoside phosphorylase, adenosine deaminase, inosine-guanosine kinase, guanosine monophosphate reductase, 6-phosphogluconoate deydrase, ~~phophoglucose~~ phosphoglucose isomerase, adenine deaminase, and xanthosine phosphorylase.

14. (Previously Presented) The method according to claim 13, further comprising increasing expression of a gene encoding an enzyme involved in purine nucleoside biosynthesis in said microorganism, wherein said enzyme involved in purine nucleoside biosynthesis is a phosphoribosyl pyrophosphate amidotransferase or a phosphoribosyl pyrophosphate synthetase.

15. (Previously Presented) The method according to claim 13, further comprising deregulating control of an enzyme involved in purine nucleoside biosynthesis in said microorganism, wherein said enzyme involved in purine nucleoside biosynthesis is a phosphoribosyl pyrophosphate amidotransferase or a phosphoribosyl pyrophosphate synthetase.

16. (Currently Amended) The method according to claim 15, wherein the enzyme involved in the purine nucleoside biosynthesis is phosphoribosyl pyrophosphate amidotransferase and wherein control of said enzyme involved in the purine nucleoside biosynthesis is desensitized by desensitization of feedback inhibition arising from replacing at least one of the lysine residue corresponding to position 326 of the Escherichia *purF* gene

product with a glutamine residue or the proline residue corresponding to position 410 of the Escherichia *purF* gene product with a tryptophan residue.

17. (Previously Presented) The method according to claim 14, wherein the enzyme involved in the purine nucleoside biosynthesis is phosphoribosyl pyrophosphate amidotransferase.

18. (Previously Presented) The method according to claim 15, wherein the enzyme involved in the purine nucleoside biosynthesis is phosphoribosyl pyrophosphate amidotransferase.

19. (Canceled)

20. (Previously Presented) The method according to claim 14, wherein the enzyme involved in the purine nucleoside biosynthesis is phosphoribosyl pyrophosphate synthetase.

21. (Previously Presented) The method according to claim 15, wherein the enzyme involved in the purine nucleoside biosynthesis is phosphoribosyl pyrophosphate synthetase.

22. (Previously Presented) The method according to claim 15, wherein control of said enzyme involved in the purine nucleoside biosynthesis is derepressed by inactivation of a purine repressor encoded by the *purR* gene from *Escherichia coli.*

23. – 24. (Canceled)

25. (Previously Presented) The method according to claim 13, further comprising inhibiting incorporation of a purine nucleoside into said microorganism by blockage of a reaction catalyzed by nucleoside permease.

26. (Canceled)

27. (Previously Presented) The method according to claim 13, wherein the enzyme is phosphoglucose isomerase.

28. (New) The method of Claim 27, wherein said phosphoglucose isomerase is encoded by a gene obtainable by PCR amplification employing the primer pair of SEQ ID NO: 22 and SEQ ID NO: 23.